

MEAN LAKE LEVELS DURING JUNE, 1923.

By UNITED STATES LAKE SURVEY.

[Detroit, Mich., July 9, 1923.]

The following data are reported in the "Notice to Mariners" of the above date:

Data.	Lakes. ¹			
	Superior.	Michigan and Huron.	Erie.	Ontario.
Mean level during June, 1923:	<i>Fect.</i>	<i>Fect.</i>	<i>Fect.</i>	<i>Fect.</i>
Above mean sea level at New York.....	601.67	579.86	572.02	245.93
Above or below—				
Mean stage of May, 1923.....	+0.02	+0.26	+0.15	+0.31
Mean stage of June, 1922.....	-0.47	-0.71	-0.85	-0.82
Average stage for June, last 10 years..	-0.76	-1.09	-1.00	-0.95
Highest recorded June stage.....	-1.76	-3.74	-2.50	-2.70
Lowest recorded June stage.....	+0.43	-0.04	+0.45	+1.04
Average relation of the June level to—				
May, level.....		+0.20	+0.20	+0.20
July, level.....		-0.10	0.00	0.00

¹ Lake St. Clair's level: In June, 574.71 feet.

EFFECT OF WEATHER UPON CROPS AND FARMING OPERATIONS, JUNE, 1923.

By J. B. KINGER, Meteorologist.

June was too wet for wheat during the first half of the month in Kansas and Oklahoma, with complaints of grain lodging from too rank growth; elsewhere winter wheat made mostly satisfactory progress, especially in the more northwestern States, where widespread rains were beneficial. The month, on the whole, was favorable for spring wheat, except during the week ending June 19, which was decidedly detrimental in North Dakota and northern Minnesota because of deficient rainfall, high temperatures, and hot winds, especially on lands where the crop was not well seeded.

Wheat ripened rapidly during the latter part of the month under the influence of warm weather, and harvest

was in progress by the 25th northward to portions of Maryland and eastern Kansas. The cool weather the last of the month was more favorable for spring wheat, with exceptionally favorable conditions prevailing in South Dakota and Montana. Oats improved in most Northern States, but were heading short in interior sections east of the Mississippi River. Rain was very beneficial for this crop in the extreme upper Mississippi Valley, while conditions were favorable in the northern Plains.

The weather was favorable for corn, as a rule, during much the greater part of the month. The drier weather in the upper Mississippi Valley was very helpful in permitting farmers to overcome weedy fields, while warmth produced rapid growth until the cool wave near the close of the month. Corn was fairly well cultivated in the Ohio Valley States, except where it was too wet in the southern portions of Indiana and Illinois, and in western Kentucky. The crop made vigorous, healthy growth in the extreme lower Missouri Valley.

Better cotton weather was experienced than during the preceding month, particularly in the east Gulf States where less rainfall permitted much needed cultivation, although some sections continued too wet. Cotton made fair to very good progress in the more western portion of the belt, except that late-planted needed more moisture in parts of Texas. At the close of the month the cotton crop was considerably later than in an average season.

There was insufficient rain for pastures and hay crops in many localities from the upper Mississippi Valley eastward, but grasses were in fine condition in the central and northern Plains, except in a few dry localities. The weather was exceptionally favorable for ranges and stock in the central and northern Rocky Mountain-Plateau districts, particularly in the Northwest, but rain was needed in much of the Southwest, especially in western New Mexico and in Arizona. The weather was generally favorable for fruit in practically all sections of the country.